

## EAST Search History

Ref #	Hits	Search Query	DBs	Default Operator	Plurals	Time Stamp
L1	0	1-palitoyl, with 2-oleoyl with phosphatidylcholine	US-PGPUB; USPAT; EPO; JPO; DERWENT	OR	ON	2006/08/03 11:37
L2	15	1-palmitoyl with 2-oleoyl with phosphatidylcholine	US-PGPUB; USPAT; EPO; JPO; DERWENT	OR	ON	2006/08/03 12:18
L3	1	1-palmitoyl with 2-linoleoyl with phosphatidylcholine	US-PGPUB; USPAT; EPO; JPO; DERWENT	OR	ON	2006/08/03 11:42
L4	7	1-palmitoyl with 2-oleoyl with phosphatidylcholine and administering	US-PGPUB; USPAT; EPO; JPO; DERWENT	OR	ON	2006/08/03 12:14
L5	5	1-palmitoyl with 2-oleoyl with phosphatidylcholine and administering and intravenous	US-PGPUB; USPAT; EPO; JPO; DERWENT	OR	ON	2006/08/03 12:15
L6	0	1-palmitoyl with 2-oleoyl with phosphatidylcholine and administering and intravenous and shingomyelin	US-PGPUB; USPAT; EPO; JPO; DERWENT	OR	ON	2006/08/03 12:16
L7	5	1-palmitoyl with 2-oleoyl with phosphatidylcholine and administering and intravenous and sphingomyelin	US-PGPUB; USPAT; EPO; JPO; DERWENT	OR	ON	2006/08/03 12:16
L8	2	1-palmitoyl with 2-oleoyl with phosphatidylcholine and insulin	US-PGPUB; USPAT; EPO; JPO; DERWENT	OR	ON	2006/08/03 12:18
L9	2	1-palmitoyl with 2-oleoyl with phosphatidylcholine and diabetes	US-PGPUB; USPAT; EPO; JPO; DERWENT	OR	ON	2006/08/03 12:18
L10	2	1-palmitoyl with 2-oleoyl with phosphatidylcholine and diabetes and complications	US-PGPUB; USPAT; EPO; JPO; DERWENT	OR	ON	2006/08/03 12:19
L11	1	1-palmitoyl with 2-oleoyl with phosphatidylcholine and metabolic with syndrome with X	US-PGPUB; USPAT; EPO; JPO; DERWENT	OR	ON	2006/08/03 12:19

## EAST Search History

L12	3498	liposomal with suspension	US-PGPUB; USPAT; EPO; JPO; DERWENT	OR	ON	2006/08/03 12:20
L13	5	liposomal with suspension and I2	US-PGPUB; USPAT; EPO; JPO; DERWENT	OR	ON	2006/08/03 14:12



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<a href="#">#11</a> Search rye K A 1996		14:30:33	<a href="#">7</a>
<a href="#">#8</a> Search 1-palmitoyl 2-oleoyl phosphatidylcholine sphingomyelin		11:50:47	<a href="#">38</a>
<a href="#">#5</a> Search 1-palmitoyl 2-oleoyl phosphatidylcholine lipoprotein		11:47:11	<a href="#">60</a>
<a href="#">#4</a> Search 1-palmitoyl 2-oleoyl phosphatidylcholine medicament		11:43:49	<a href="#">0</a>
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<a href="#">#2</a> Search 1-palmitoyl 2-oleoyl phosphatidylcholine insulin		11:43:11	<a href="#">0</a>

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Jul 25 2006 06:31:58

FILE 'HOME' ENTERED AT 11:56:28 ON 03 AUG 2006

=> index bioscience

FILE 'DRUGMONOG' ACCESS NOT AUTHORIZED

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SINCE FILE	TOTAL
ENTRY	SESSION
0.21	0.21

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INDEX 'ADISCTI, ADISINSIGHT, ADISNEWS, AGRICOLA, ANABSTR, ANTE, AQUALINE, AQUASCI, BIOENG, BIOSIS, BIOTECHABS, BIOTECHDS, BIOTECHNO, CABA, CAPLUS, CEABA-VTB, CIN, CONFSCI, CROPB, CROPU, DDFB, DDFU, DGENE, DISSABS, DRUGB, DRUGMONOG2, DRUGU, EMBAL, EMBASE, ...' ENTERED AT 11:56:55 ON 03 AUG 2006

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=> 1-palmitoyl with 2-oleoyl with phosphatidylcholine and sphingomyelin

13 FILE BIOSIS  
13 FILES SEARCHED...  
16 FILE CAPLUS  
23 FILES SEARCHED...  
1 FILE EMBAL  
30 FILES SEARCHED...  
2 FILE IFIPAT  
41 FILES SEARCHED...  
2 FILE LIFESCI  
48 FILES SEARCHED...  
26 FILE USPATFULL  
1 FILE USPAT2  
62 FILES SEARCHED...  
3 FILE WPIDS  
66 FILES SEARCHED...  
3 FILE WPINDEX

9 FILES HAVE ONE OR MORE ANSWERS, 68 FILES SEARCHED IN STNINDEX

L1 QUE 1-PALMITOYL WITH 2-OLEOYL WITH PHOSPHATIDYLCHOLINE AND SPHINGOMYELIN

=> d rank

F1	26	USPATFULL
F2	16	CAPLUS
F3	13	BIOSIS
F4	3	WPIDS
F5	3	WPINDEX
F6	2	IFIPAT
F7	2	LIFESCI
F8	1	EMBAL
F9	1	USPAT2

=> file caplus biosis wpids ifipat embal

COST IN U.S. DOLLARS

SINCE FILE	TOTAL
ENTRY	SESSION
9.76	9.97

FULL ESTIMATED COST

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=> 1-palmitoyl with 2-oleoyl with phosphatidylcholine and sphingomyelin  
3 FILES SEARCHED...

L2 35 1-PALMITOYL WITH 2-OLEOYL WITH PHOSPHATIDYLCHOLINE AND SPHINGOMY  
ELIN

=> dup remove l2  
PROCESSING COMPLETED FOR L2

L3 27 DUP REMOVE L2 (8 DUPLICATES REMOVED)

=> d ti 1-27

L3 ANSWER 1 OF 27 EMBAL COPYRIGHT (c) 2006 Elsevier B.V. All rights  
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TI Absence of fluid-ordered/fluid-disordered phase coexistence in  
ceramide/POPC mixtures containing cholesterol.

L3 ANSWER 2 OF 27 IFIPAT COPYRIGHT 2006 IFI on STN

TI METHOD OF TREATING INSULIN RESISTANCE, ADULT ONSET DIABETES AND METABOLIC  
SYNDROME X

L3 ANSWER 3 OF 27 CAPLUS COPYRIGHT 2006 ACS on STN

TI Plasmon-waveguide Resonance Studies of Lateral Segregation of Lipids and  
Proteins into Microdomains (Rafts) in Solid-supported Bilayers

L3 ANSWER 4 OF 27 CAPLUS COPYRIGHT 2006 ACS on STN

TI The 3-hydroxy group and 4,5-trans double bond of sphingomyelin  
are essential for modulation of galactosylceramide transmembrane asymmetry

L3 ANSWER 5 OF 27 BIOSIS COPYRIGHT (c) 2006 The Thomson Corporation on STN

TI Interaction of human apolipoprotein A-I with model membranes exhibiting  
lipid domains.

L3 ANSWER 6 OF 27 WPIDS COPYRIGHT 2006 THE THOMSON CORP on STN

TI Use of liposomal suspension of lipoprotein small unilamellar vesicles  
containing predominantly phospholipid for treatment of insulin resistance,  
adult onset diabetes and metabolic syndrome X.

L3 ANSWER 7 OF 27 IFIPAT COPYRIGHT 2006 IFI on STN

TI METHODS AND COMPOSITIONS FOR THE TREATMENT OF ISCHEMIC REPERFUSION;  
CONTACTING THE TISSUE OR ORGAN WITH AN EFFECTIVE AMOUNT OF AN  
APOLIPOPROTEIN TO TREAT, PREVENT OR REDUCE ISCHEMIC REPERFUSION INJURY

L3 ANSWER 8 OF 27 BIOSIS COPYRIGHT (c) 2006 The Thomson Corporation on STN

TI AFM observation of GM3-enriched microdomain composed of lipids extracted  
from mouse B16 melanoma cells.

L3 ANSWER 9 OF 27 CAPLUS COPYRIGHT 2006 ACS on STN DUPLICATE 1

TI Use of cyclodextrin for AFM monitoring of model raft formation

L3 ANSWER 10 OF 27 BIOSIS COPYRIGHT (c) 2006 The Thomson Corporation on  
STN

TI Quantitation of the propensity of membrane components for the assembly of  
detergent-resistant membrane domains.

L3 ANSWER 11 OF 27 BIOSIS COPYRIGHT (c) 2006 The Thomson Corporation on  
STN  
TI Structural features of sphingomyelin that influence its capacity  
to alter the transmembrane distribution of beta-galactosylceramide.

L3 ANSWER 12 OF 27 CAPLUS COPYRIGHT 2006 ACS on STN DUPLICATE 2  
TI Compositions comprising apolipoprotein, lecithin cholesterol  
acyltransferase or paraoxonase for treatment of ischemic reperfusion  
injury

L3 ANSWER 13 OF 27 CAPLUS COPYRIGHT 2006 ACS on STN  
TI Effects of sphingomyelin on melittin pore formation

L3 ANSWER 14 OF 27 CAPLUS COPYRIGHT 2006 ACS on STN  
TI Thermotropic behavior of lipid domains in model membranes

L3 ANSWER 15 OF 27 WPIDS COPYRIGHT 2006 THE THOMSON CORP on STN  
TI Preparing a substrate surface (SS) supporting lipid film membrane  
structure, for studying molecular interaction, comprises contacting SS  
with a detergent/lipid mixed micelle preparation, and then liquid free  
from detergent.

L3 ANSWER 16 OF 27 CAPLUS COPYRIGHT 2006 ACS on STN DUPLICATE 3  
TI Sphingomyelin modulates the transbilayer distribution of  
galactosylceramide in phospholipid membranes

L3 ANSWER 17 OF 27 CAPLUS COPYRIGHT 2006 ACS on STN DUPLICATE 4  
TI Probing for Preferential Interactions among Sphingolipids in Bilayer  
Vesicles Using the Glycolipid Transfer Protein

L3 ANSWER 18 OF 27 BIOSIS COPYRIGHT (c) 2006 The Thomson Corporation on  
STN  
TI Membrane fusion induced by a lipopeptidic epitope from VP3 capsid protein  
of hepatitis A virus.

L3 ANSWER 19 OF 27 CAPLUS COPYRIGHT 2006 ACS on STN  
TI New fluorescent cholesterol analogs as membrane probes

L3 ANSWER 20 OF 27 CAPLUS COPYRIGHT 2006 ACS on STN DUPLICATE 5  
TI Measurement of spontaneous transfer and transbilayer movement of  
BODIPY-labeled lipids in lipid vesicles

L3 ANSWER 21 OF 27 CAPLUS COPYRIGHT 2006 ACS on STN  
TI Structure and thermotropic behavior of mixed choline phospholipid model  
membranes

L3 ANSWER 22 OF 27 CAPLUS COPYRIGHT 2006 ACS on STN DUPLICATE 6  
TI The influence of sphingomyelin on the structure and function of  
reconstituted high density lipoproteins

L3 ANSWER 23 OF 27 CAPLUS COPYRIGHT 2006 ACS on STN  
TI Alteration in the reactivity of sphingomyelin in  
mitogen-stimulated lymphocytes

L3 ANSWER 24 OF 27 CAPLUS COPYRIGHT 2006 ACS on STN DUPLICATE 7  
TI Cholesterol's Interfacial Interactions with Sphingomyelins  
and-Phosphatidylcholines: Hydrocarbon Chain Structure Determines the  
Magnitude of Condensation

L3 ANSWER 25 OF 27 CAPLUS COPYRIGHT 2006 ACS on STN  
TI Analysis of saturated phosphatidylcholine in amniotic fluid by <sup>31</sup>P NMR

L3 ANSWER 26 OF 27 CAPLUS COPYRIGHT 2006 ACS on STN DUPLICATE 8  
TI The lateral distribution of pyrene-labeled sphingomyelin and

glucosylceramide in phosphatidylcholine bilayers

L3 ANSWER 27 OF 27 BIOSIS COPYRIGHT (c) 2006 The Thomson Corporation on  
STN  
TI CROSS POLARIZATION PHOSPHORUS-31 NMR OF PHOSPHOLIPIDS.

=> d ab bib 24, 22, 21 , 16, 12, 11, 7, 6

L3 ANSWER 24 OF 27 CAPLUS COPYRIGHT 2006 ACS on STN DUPLICATE 7  
AB Cholesterol's interfacial interaction with different sphingomyelins and phosphatidylcholines has been investigated using a Langmuir film balance. The average mol. area of cholesterol/sphingomyelin (SM) or cholesterol/phosphatidylcholine (PC) mixed monolayers was determined as a function of film composition from the force-area isotherms measured at 24°. In contrast to previous results [Lund-Katz, S., Laboda, H. M., McLean, L. R., & Phillips, M. C. (1988) Biochem. 27, 3416-3423], little difference was observed in equimolar cholesterol's "condensing effect" of SMs compared to PCs when their phase state was similar and when their hydrocarbon structural differences were minimized. For PCs, this meant that one acyl chain had to be long and capable of assuming an extended conformation and thus configurationally similar to the long-chain base of SM. This condition facilitated strong van der Waals attractive interactions with cholesterol's planar steroid ring and was satisfied when sn-1 acyl chain of PC was either myristate or palmitate. Under these conditions, the structural requirements of the sn-2 chain of PC were mitigated. For instance, at equimolar cholesterol, almost no difference was observed in the apparent mol. area condensations of 1-palmitoyl-2-oleoyl-PC and 1-palmitoyl-2-arachidonoyl-PC at surface pressures between 10 and 40 mN/m. In contrast, the apparent mol. area condensations of dioleoyl-PC and diarachidonoyl-PC were substantially reduced under identical exptl. conditions. The results are discussed in terms of the relative importance of phospholipid/sphingolipid hydrocarbon and headgroup structure in determining the extent of interaction with cholesterol. Conclusions were based on investigation of egg SM, bovine brain SM, N-oleoyl-SM, dipalmitoyl-PC, dimyristoyl-PC, 1-myristoyl-2-palmitoyl-PC, 1-palmitoyl-2-oleoyl-PC, 1-palmitoyl-2-arachidonoyl-PC, dioleoyl-PC, dinervonoyl-PC, diarachidonoyl-PC, and diphytanoyl-PC as well as comparison with cholesterol's condensation of various galactosylceramide mol. species [Ali, S., Smaby, J.M., Brockman, H.L., & Brown, R.E. (1994) Biochem. 33, 2900-2906].

AN 1994:528266 CAPLUS

DN 121:128266

TI Cholesterol's Interfacial Interactions with Sphingomyelins and-Phosphatidylcholines: Hydrocarbon Chain Structure Determines the Magnitude of Condensation

AU Smaby, Janice M.; Brockman, Howard L.; Brown, Rhoderick E.

CS Hormel Institute, University of Minnesota, Austin, MN, 55912, USA

SO Biochemistry (1994), 33(31), 9135-42

CODEN: BICHAW; ISSN: 0006-2960

DT Journal

LA English

L3 ANSWER 22 OF 27 CAPLUS COPYRIGHT 2006 ACS on STN DUPLICATE 6  
AB The effect of sphingomyelin (SPM) on the structure and function of discoidal and spherical reconstituted high d. lipoproteins (rHDL) has been studied. Three preps. of discoidal rHDL with 1-palmitoyl-2-oleoyl phosphatidylcholine (POPC)/SPM/unesterified cholesterol (UC)/apolipoprotein (apo)A-I molar ratios of 99.6/0.0/10.2/1.0, 86.0/13.6/10.8/1.0, and 72.5/26.3/11.4/1.0 were prepared by cholate dialysis. SPM did not affect discoidal rHDL size or surface charge. Esterification of cholesterol by lecithin:cholesterol acyltransferase (LCAT) was inhibited in the SPM-containing discoidal rHDL. When the discoidal rHDL of POPC/SPM/UC/apo-I molar ratio 99.6/0.0/10.2/1.0

were incubated with low d. lipoproteins (LDL) and LCAT, SPM transferred spontaneously from the LDL to the rHDL ( $t_{1/2} = 0.8$  h) and spherical particles with a POPC/SPM/UC/CE/apoA-I molar ratio of 24.6/4.9/3.6/24.9/1.0 were formed. Depleting the spherical rHDL of SPM head groups by incubation with sphingomyelinase increased the neg. charge on the surface, but did not change their size. Cholesteryl ester transfer protein (CETP)-mediated transfers of cholesteryl esters and triglyceride between spherical rHDL and Intralipid were not affected by SPM head group depletion. The effect of SPM on rHDL structure was assessed spectroscopically. SPM increased POPC acyl chain and head group packing in the discoidal rHDL. When the spherical rHDL were depleted of SPM head groups, POPC acyl chain packing order decreased, but head group packing order was not affected. SPM inhibited the lipid-water interfacial hydration of discoidal rHDL. This parameter was not affected when the spherical rHDL were depleted of SPM head groups. The SPM mol. and the SPM head group, resp., inhibited the unfolding of apoA-I in discoidal and spherical rHDL. It is concluded that (i) SPM influences the structure of discoidal and spherical rHDL, (ii) SPM inhibits the LCAT reaction in discoidal rHDL, and (iii) the SPM head group does not affect CETP-mediated lipid transfers into or out of spherical rHDL.

AN 1996:130547 CAPLUS

DN 124:168765

TI The influence of sphingomyelin on the structure and function of reconstituted high density lipoproteins

AU Rye, Kerry-Anne; Hime, Neil J.; Barter, Philip J.

CS Division Cardiovascular Services, University Adelaide, Adelaide, 5000, Australia

SO Journal of Biological Chemistry (1996), 271(8), 4243-50

CODEN: JBCHA3; ISSN: 0021-9258

PB American Society for Biochemistry and Molecular Biology

DT Journal

LA English

L3 ANSWER 21 OF 27 CAPLUS COPYRIGHT 2006 ACS on STN

AB Phosphatidylcholines and sphingomyelins are among the most abundant lipids in mammalian cell membranes, being major components of platelets or erythrocytes, and of the lipid monolayer of lipoproteins. General efforts have been devoted to the elucidation of the interaction of the ubiquitous membrane component cholesterol with these choline phospholipids, but fewer studies have been reported on the interaction between the phospholipids themselves. A gel to liquid-crystalline phase transition was observed for pure sphingomyelin liposomes at physiol. temperature, while palmitoyl-oleoyl phosphatidylcholine adopts a liquid-crystalline phase in the temperature range 273-323 K. The two phospholipids are

miscible at all molar ratios in the liquid-crystalline phase, characterized by very similar lamellar repeat distances for all binary lipid mixts. The gel phase of pure sphingolipid liposomes exhibited a markedly smaller lamellar repeat distance as compared to mixed lipid vesicles, which increase slightly with temperature for the pure sphingomyelin (66.9-69.2 Å). Concomitantly, altered hydrocarbon chain packing was observed. Similar diffractograms were obtained in the presence of 10 mol% phosphatidylcholine. However, in the composition range between 20 and 60 mol% phosphatidylcholine in the phosphatidylcholine-sphingomyelin admixt., the lamellar repeat distance in the gel phase was markedly increased and remained almost constant (around 75 Å) below the phase transition.

AN 1998:80337 CAPLUS

DN 128:240978

TI Structure and thermotropic behavior of mixed choline phospholipid model membranes

AU Degovics, Gabor; Latal, Angelika; Prenner, Elmar; Kriechbaum, Manfred; Lohner, Karl

CS Osterreichische Akademie Wissenschaftern, Inst. Biophysik und



Rontgenstrukturforschung, Graz, A-8010, Austria  
SO Journal of Applied Crystallography (1997), 30(5, Pt. 2), 776-780  
CODEN: JACGAR; ISSN: 0021-8898  
PB Munksgaard International Publishers Ltd.  
DT Journal  
LA English  
RE.CNT 28 THERE ARE 28 CITED REFERENCES AVAILABLE FOR THIS RECORD  
ALL CITATIONS AVAILABLE IN THE RE FORMAT

L3 ANSWER 16 OF 27 CAPLUS COPYRIGHT 2006 ACS on STN DUPLICATE 3  
AB The interrelationships among sphingolipid structure, membrane curvature, and glycosphingolipid transmembrane distribution remain poorly defined despite the emerging importance of sphingolipids in curved regions and vesicle buds of biomembranes. Here, we describe a novel approach to investigate the transmembrane distribution of galactosylceramide in phospholipid small unilamellar vesicles by <sup>13</sup>C NMR spectroscopy. Quantitation of the transbilayer distribution of [6-<sup>13</sup>C]galactosylceramide (99.8% isotopic enrichment) was achieved by exposure of vesicles to the paramagnetic ion, Mn<sup>2+</sup>. The data show that [6-<sup>13</sup>C]galactosylceramide prefers (70%) the inner leaflet of phosphatidylcholine vesicles. Increasing the sphingomyelin content of the 1-palmitoyl-2-oleoyl-phosphatidylcholine vesicles shifted galactosylceramide from the inner to the outer leaflet. The amount of galactosylceramide localized in the inner leaflet decreased from 70% in pure 1-palmitoyl-2-oleoyl-phosphatidylcholine vesicles to only 40% in 1-palmitoyl-2-oleoyl-phosphatidylcholine/sphingomyelin (1:2) vesicles. The present study demonstrates that sphingomyelin can dramatically alter the transbilayer distribution of a monohexosylceramide, such as galactosylceramide, in 1-palmitoyl-2-oleoyl-phosphatidylcholine/sphingomyelin vesicles. The results suggest that sphingolipid-sphingolipid interactions that occur even in the absence of cholesterol play a role in controlling the transmembrane distributions of cerebroside.

AN 2002:441685 CAPLUS  
DN 137:197299  
TI Sphingomyelin modulates the transbilayer distribution of galactosylceramide in phospholipid membranes  
AU Mattjus, Peter; Malewicz, Barbara; Valiyaveetil, Jacob T.; Baumann, Wolfgang J.; Bittman, Robert; Brown, Rhoderick E.  
CS Hormel Institute, University of Minnesota, Austin, MN, 55912, USA  
SO Journal of Biological Chemistry (2002), 277(22), 19476-19481  
CODEN: JBCHA3; ISSN: 0021-9258  
PB American Society for Biochemistry and Molecular Biology  
DT Journal  
LA English  
RE.CNT 60 THERE ARE 60 CITED REFERENCES AVAILABLE FOR THIS RECORD  
ALL CITATIONS AVAILABLE IN THE RE FORMAT

L3 ANSWER 12 OF 27 CAPLUS COPYRIGHT 2006 ACS on STN DUPLICATE 2  
AB The invention provides methods and compns. for treating or preventing ischemic reperfusion injury based on the surprising discovery that administration of ischemic reperfusion agent can reduce or protect individual from ischemic reperfusion injury. The ischemic reperfusion agent comprises apolipoproteins, lecithin cholesterol acyltransferase or paraoxonase, and can be administered in the form of complex with a lipid, preferably phospholipid such as 1-palmitoyl-2-oleoyl phosphatidylcholine.  
AN 2003:931410 CAPLUS  
DN 139:391395  
TI Compositions comprising apolipoprotein, lecithin cholesterol acyltransferase or paraoxonase for treatment of ischemic reperfusion injury

IN Bisgaier, Charles L.  
PA Esperion Therapeutics, Inc., USA  
SO PCT Int. Appl., 64 pp.  
CODEN: PIXXD2  
DT Patent  
LA English  
FAN.CNT 1

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI	WO 2003097696	A1	20031127	WO 2003-US15469	20030516
	W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, UZ, VC, VN, YU, ZA, ZM, ZW				
	RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PT, RO, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG				
	CA 2485989	AA	20031127	CA 2003-2485989	20030516
	AU 2003234625	A1	20031202	AU 2003-234625	20030516
	US 2004038891	A1	20040226	US 2003-440214	20030516
	EP 1556413	A1	20050727	EP 2003-728968	20030516
	R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR, BG, CZ, EE, HU, SK				
	CN 1668645	A	20050914	CN 2003-816973	20030516
	JP 2006502976	T2	20060126	JP 2004-506368	20030516
PRAI	US 2002-381653P	P	20020517		
	US 2002-405478P	P	20020823		
	WO 2003-US15469	W	20030516		

RE.CNT 3 THERE ARE 3 CITED REFERENCES AVAILABLE FOR THIS RECORD  
ALL CITATIONS AVAILABLE IN THE RE FORMAT

L3 ANSWER 11 OF 27 BIOSIS COPYRIGHT (c) 2006 The Thomson Corporation on STN

AB We recently developed a <sup>13</sup>C NMR approach that relies on exposure of 1-palmitoyl-2-oleoyl phosphatidylcholine (POPC) vesicles containing (6-<sup>13</sup>C)galactosylceramide (GalCer) to the paramagnetic ion, Mn<sup>2+</sup>, for defining the transbilayer distribution of glycolipids in phospholipid vesicles (Mattjus et al., 2002, J. Biol. Chemical 277, 19476-19481). We found that GalCer is preferentially localized (70%) in the inner leaflet of POPC sonicated unilamellar vesicles and that increasing the sphingomyelin (SM) content of the vesicles shifts the (6-<sup>13</sup>C)GalCer distribution from the inner to the outer leaflet. To assess the structural features of SM that are essential for altering the transbilayer distribution of GalCer, various SM analogs were evaluated. Among the SM analogs were dihydro-SM and 3-deoxy-SM as well as dipalmitoylphosphatidyl-choline (DPPC), a popular model 'raft lipid'. DPPC is structurally similar to SM because of its phosphorylcholine headgroup and its saturated acyl chains. Dihydro SM contains no 4,5-trans double bond and 3-deoxy-SM lacks the 3-hydroxy group in their respective sphingoid bases. DPPC, dihydro-SM, and 3-deoxy-SM were incapable of duplicating the shift in the transbilayer distribution of GalCer that was induced by SM. Moreover, mixing as little as 15 mole% of dihydro-SM into SM interfered with its capacity to alter the transbilayer distribution of GalCer. The results provide insights into the structural features of SM that are essential for altering the transbilayer distribution of GalCer and support the hypothesis that specific interactions can take place among certain sphingolipids.

AN 2004:111876 BIOSIS

DN PREV200400114522

TI Structural features of sphingomyelin that influence its capacity to alter the transmembrane distribution of beta-galactosylceramide.

AU Malewicz, Barbara M. [Reprint Author]; Valiyaveettil, Jacob T.; Jacob, Kochurani; Mattjus, Peter [Reprint Author]; Baumann, Wolfgang J. [Reprint Author]; Bittman, Robert; Brown, Rhoderick E. [Reprint Author]  
CS Hormel Institute, University of Minnesota, Austin, MN, USA  
SO Biophysical Journal, (January 2004) Vol. 86, No. 1, pp. 198a. print.  
Meeting Info.: 48th Annual Meeting of the Biophysical Society. Baltimore, MD, USA. February 14-18, 2004. Biophysical Society.  
ISSN: 0006-3495 (ISSN print).  
DT Conference; (Meeting)  
Conference; Abstract; (Meeting Abstract)  
LA English  
ED Entered STN: 25 Feb 2004  
Last Updated on STN: 25 Feb 2004

L3 ANSWER 7 OF 27 IFIPAT COPYRIGHT 2006 IFI on STN  
AB The invention provides methods and compositions for treating or preventing ischemic reperfusion injury. The methods of the instant invention comprise the administration of compositions comprising apolipoproteins, lecithin cholesterol acyltransferase or paraoxonase and lipid complexes thereof to treat, reduce or prevent ischemic reperfusion injury.  
AN 10531674 IFIPAT;IFIUDB;IFICDB  
TI METHODS AND COMPOSITIONS FOR THE TREATMENT OF ISCHEMIC REPERFUSION; CONTACTING THE TISSUE OR ORGAN WITH AN EFFECTIVE AMOUNT OF AN APOLIPOPROTEIN TO TREAT, PREVENT OR REDUCE ISCHEMIC REPERFUSION INJURY  
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PA Unassigned Or Assigned To Individual (68000)  
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PI US 2004038891 A1 20040226  
AI US 2003-440214 20030516  
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FI US 2004038891 20040226  
DT Utility; Patent Application - First Publication  
FS CHEMICAL  
APPLICATION  
PARN This application claims priority to U.S. Provisional Applications Serial Nos. 60/381,653 (filed May 17, 2002) and 60/ 405,478 (filed Aug. 23, 2002), each of which is incorporated herein by reference in its entirety.  
CLMN 58  
GI 19 Figure(s).  
FIG. 1 provides a diagram of two apolipoprotein A-I Milano chains;  
FIG. 2 provides a diagram of a Langendorff Apparatus to treat ex vivo and monitor cardiac function in the isolated rabbit heart;  
FIG. 3 provides a closer view of the heart as mounted in the Langendorff Apparatus;  
FIG. 4 provides an example of a protocol wherein isolated hearts were treated with vehicle or ETC-216 prior to the onset of ischemia;  
FIG. 5 provides creatine kinase activity in coronary venous effluent;  
FIG. 6 provides real-time monitoring of cardiac function collected from a vehicle and an ETC-216 treated isolated rabbit heart in the Langendorff Apparatus;  
FIG. 7 provides the temporal changes in left ventricular developed pressure (LVDP) in isolated rabbit hearts before, during and after 30 minutes of global ischemic arrest and 60 minutes of reperfusion;  
FIG. 8 provides temporal changes in left ventricular enddiastolic pressure (LVEDP) in isolated rabbit hearts before, during and after 30 minutes of

global ischemic arrest and 60 minutes of reperfusion;  
 FIG. 9 provides temporal changes in coronary perfusion pressure (CPP) in isolated rabbit hearts before, during and after 30 minutes of global ischemic arrest and 60 minutes of reperfusion;  
 FIG. 10 provides lipid hydroperoxide content in tissue homogenates from vehicle and ETC-216 treated rabbit hearts subjected to global ischemic arrest for 30 minutes followed by 60 minutes reperfusion;  
 FIG. 11 provides electron microscope images of cardiac muscle samples from vehicle and ETC-216 treated rabbit hearts;  
 FIG. 12 provides an additional protocol of the present invention wherein one pretreatment was administered prior to the onset of ischemia in the acute administration group and two pretreatments were administered prior to the onset of ischemia in the chronic administration group;  
 FIG. 13 provides a protocol for determination of infarct size;  
 FIG. 14 provides infarct percent of area at risk, infarct percent of left ventricle, and area at risk percent of left ventricle in rabbits treated once (i.e., acute treatment) or treated twice (i.e., chronic treatment) with ETC-216 (100 mg/kg) or an equivalent volume of vehicle;  
 FIG. 15 provides an additional protocol of the present invention wherein rabbits were pretreated prior to the onset of ischemia with either vehicle (Group 1) or 10, 3 or 1 mg/kg of ETC-216 (Group 2);  
 FIG. 16 provides infarct percent of area at risk, infarct percent of left ventricle, and area at risk percent of left ventricle determined in rabbits treated once (i.e., acute treatment) with 10, 3 or 1 mg/kg of ETC-216 or with an equivalent volume of sucrose-mannitol vehicle for each group;  
 FIG. 17 provides temporal changes in lipoprotein unesterified cholesterol;  
 FIG. 18 provides an additional protocol of the present invention wherein a single treatment of vehicle or ETC-216 was administered during the last 5 minutes of the 30 minute ischemic period; and  
 FIG. 19 provides infarct percent of area at risk, infarct percent of left ventricle, and area at risk percent of left ventricle determined in rabbits.

L3 ANSWER 6 OF 27 WPIDS COPYRIGHT 2006 THE THOMSON CORP on STN

AB WO2004039430 A UPAB: 20040603

NOVELTY - Treatment of insulin resistance, adult onset diabetes and metabolic syndrome X and its related complications involves intravenously administration of a liposomal suspension of lipoprotein small unilamellar vesicles (SUVs) containing predominantly phospholipids.

ACTIVITY - Antidiabetic.

A woman (62 years of age, height 160 cm and weight 45 kg) has dysregulation of lipid metabolism and was diagnosed as an insulin-resistant metabolic patient for 17 years. She was intravenously infused (20 - 50 drips/minutes) with 2 volumes of 90 ml per infusion (400 mg total lipid/kg body weight) of the complete liposomal suspension 6 times within a 30 days period. The results showed that triglyceride level/total cholesterol level/LDL cholesterol level decreased from 114/349/219 to 71/312/206 mg/dl respectively. Several weeks after the liposomal treatment, an oral glucose tolerance test was performed. After 2 hours of glucose application, serologic glucose level (A1) and insulin secretion (A2) was determined. The results showed that (A1) and (A2) were decreased from 143/84.4 to 82/29 mg/dl respectively.

MECHANISM OF ACTION - None given.

USE - In the preparation of a medicament for treating insulin resistance, adult onset diabetes and metabolic syndrome X and its related complications in mammals (claimed).

ADVANTAGE - The liposomal suspension of lipoprotein SUVs reduces blood glucose, insulin, total cholesterol, low density lipoprotein (LDL) cholesterol, triglyceride, creatine kinase, creatine kinase-MB, glycated hemoglobin, lipoprotein (a), serum glutamic-oxaloacetic transaminase (SGOT) and/or serum glutamic-pyruvic transaminase (SGPT) and the treatment shows negligible or no side effects.

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AN 2004-376077 [35] WPIDS  
 DNN N2004-299132 DNC C2004-141459  
 TI Use of liposomal suspension of lipoprotein small unilamellar vesicles  
 containing predominantly phospholipid for treatment of insulin resistance,  
 adult onset diabetes and metabolic syndrome X.  
 DC B04 P34  
 IN KURTZ, S J; KRUTZ, S J  
 PA (KURT-I) KURTZ S J; (KRUT-I) KRUTZ S J  
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 LU MC MW MZ NL OA PT RO SD SE SI SK SL SZ TR TZ UG ZM ZW  
 W: AE AG AL AM AT AU AZ BA BB BG BR BY BZ CA CH CN CO CR CU CZ DE DK  
 DM DZ EC EE EG ES FI GB GD GE GH GM HR HU ID IL IN IS JP KE KG KP  
 KR KZ LC LK LR LS LT LU LV MA MD MG MK MN MW MX MZ NI NO NZ OM PG  
 PH PL PT RO RU SC SD SE SG SK SL SY TJ TM TN TR TT TZ UA UG US UZ  
 VC VN YU ZA ZM ZW  
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 NO 2005002516 A 20050525 (200557)  
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 R: AL AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HU IE IT LI LT LU LV  
 MC MK NL PT RO SE SI SK TR  
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